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## The *Gyrinophilus* Salamanders of Mt. Mitchell, North Carolina

NELSON G. HAIRSTON\*

An attempt to identify a specimen of *Gyrinophilus* collected by the writer in Setrock Creek, Mt. Mitchell, Yancy County, North Carolina, on October 9, 1940, led to the discovery of a discrepancy in the literature. The following note is recorded for the benefit of future collectors.

Bishop (1924) stated that a large series of *Gyrinophilus danielsi* (Blatchley) was collected in "Steprock" Creek on October 21 and 22, 1923. He gave the altitude as over 6000 feet. This record has been widely quoted (Dunn, 1926; Brimley, 1939-41; Bishop, 1941; Bishop, 1943). Furthermore, Bishop's illustration of the species (1924, pl. 2) carries the additional information that the locality was Camp Alice. This former overnight stop for tourists was not located on "Steprock" Creek but on Lower Creek at an elevation of 5790 feet. Since Lower Creek is one of the two creeks that arise on the east side of Mt. Mitchell at an elevation of more than 6000 feet, it is probable that Bishop was collecting here rather than in "Steprock" Creek, which arises at an elevation of about 5200 feet on Little Mountain, an easterly projecting ridge of Mt. Mitchell. The name "Steprock" is an error that probably originated with the U. S. Geological Survey Map of 1902. The local name, as well as the name appearing on the Tennessee Valley Authority Map of 1942, is Setrock Creek. The only other creek arising above 6000 feet is Rock Creek, which drains the northeast face of the mountain. The Camp Alice locality record obviously rules out Rock Creek as the source of Bishop's specimens.

Mittleman and Jopson (1941) described *Gyrinophilus dunni* as a low-altitude species that is smaller than *G. danielsi* and has the throat unpigmented. *G. dunni* also has a slightly different dorsal pattern. These authors place the altitude range of the new form as below 3500 feet. Bishop (1924) refers to just such a specimen collected at an elevation between 4000 and 4500 feet. He is probably justified in regarding *dunni* as a subspecies of *danielsi* (Bishop, 1943).

The writer has collected two metamorphosed *Gyrinophilus* on Mt. Mitchell. The specimen referred to in the opening sentence was taken from Set-

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\*Department of Zoology, Northwestern University.

rock Creek at an elevation of 4800 feet. It has a total length of 123 mm., and a snout to vent length of 71 mm. The coloration and size agree closely with the original description of *G. danielsi dunni*.

The second specimen was taken at the spring that is the source of Rock Creek, elevation 6500 feet, September 14, 1946. This specimen is 123 mm. in total length, snout to vent 72 mm. The dorsal pattern agrees with that of *G. d. danielsi*, the dark spots tending to coalesce. The throat is flecked with dark brown, but does not show the reticulation of brown and white that characterizes larger specimens (Bishop, 1943).

Mittleman and Jopson (1941) designated as a paratype of *dunni* an individual from Cane River, which drains the west side of Mt. Mitchell. This specimen, taken at an elevation of 3000 feet, would appear to complete the series of records from this mountain.

These observations indicate that the 3500 foot elevation does not hold as an approximate separation of the two subspecies on the east side of Mt. Mitchell. An elevation of 5000 feet would probably be more accurate.

The various localities referred to are indicated on the accompanying map (Fig. 1).

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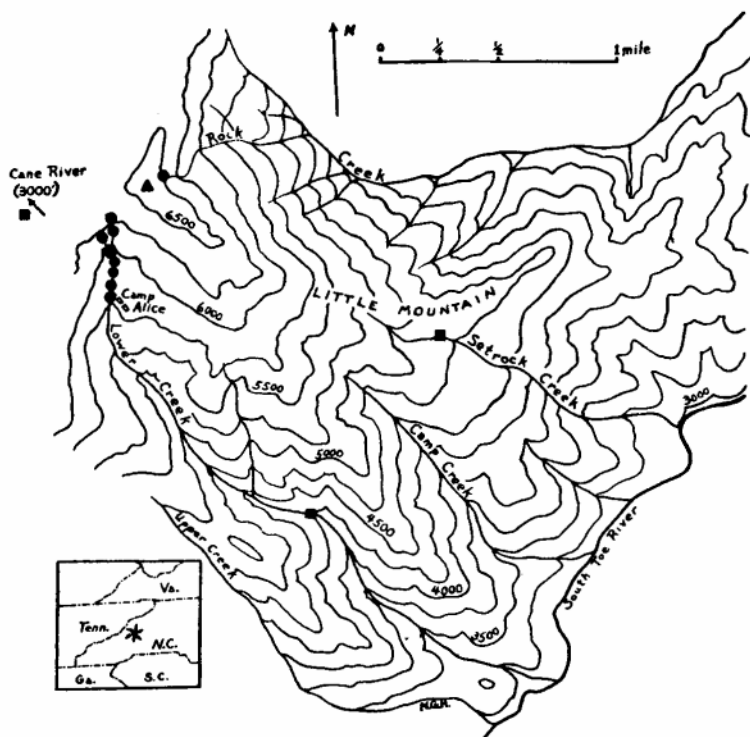


Figure 1

Contour map of the east side of Mt. Mitchell, showing local distribution of *Gyrinophilus*. Circles represent records of *G. d. danielsi*. Squares represent records of *G. danielsi dunni*. Triangle represents summit of Mt. Mitchell (6684 feet). Inset map of western North Carolina shows location of this mountain.

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